IN THE CLAIMS:

1-6. (Canceled)

- 7. (Currently Amended) A palatability enhancer for an animal food, comprising a cooked product created by a method comprising the steps of:
 - (a) creating a liquefied mixture comprising triglyceride molecules derived from at least one plant or animal source, mixed with at least one donor which functions as a donor of elements selected from the group consisting of sulfur, nitrogen, and a combination of sulfur and nitrogen; and,
 - (b) cooking the liquefied mixture under a suitable combination of temperature, pressure, and time conditions to cause: (i) breakage of a substantial quantity of the triglyceride molecules, thereby creating smaller molecular fragments; and (ii) chemical bonding of sulfur or nitrogen atoms to the smaller molecular fragments, in quantities sufficient to form a cooked product for use as a palatability enhancer for at least one type of animal food preparation; wherein cooking is performed at ambient pressure and a temperature of about 90°C to about 98°C, or cooking is performed at a pressure of greater than 10 pounds per square inch and a temperature of about 110°C to about 200°C; and

at least one second palatability enhancer ingredient prepared by hydrolytic fermentation of at least one type of cohesive animal tissue.

8, 9. (Cancelled)

- 10. (Currently Amended) An animal food product, comprising a dry or semi-dry animal food prepared by a method selected from the group consisting of pelleting, extruding, or molding, and which has on at least some of its surfaces a palatability enhancer for an animal food created by a method comprising the steps of:
 - (a) creating a liquefied mixture comprising triglyceride molecules derived from at least one plant or animal source, mixed with at least one donor which functions as a donor of elements selected from the group consisting of sulfur, nitrogen, and a combination of sulfur and nitrogen; and,
 - (b) cooking the liquefied mixture under a suitable combination of temperature, pressure, and time conditions to cause: (i) breakage of a substantial quantity of the triglyceride molecules, thereby creating smaller molecular fragments; and (ii) chemical bonding of sulfur or nitrogen atoms to the smaller molecular fragments, in quantities sufficient to form a cooked product for use as a palatability enhancer for at least one type of animal food preparation, wherein cooking is performed at ambient pressure and a temperature of about 90°C to about 98°C, or cooking is performed at a pressure of greater than 10 pounds per square inch and a temperature of about 110°C to about 200°C.

Claims 11 - 23 (Canceled)

- 24. (Previously Presented) The palatability enhancer for an animal food of Claim 7, wherein at least some of the triglyceride molecules are derived from a plant source selected from the group consisting of corn, olives, peanuts, safflower oil, palm oil, rapeseed oil, soybean oil, cottonseed oil, coconut oil, and canola oil.
- 25. (Previously Presented) The palatability enhancer for an animal food of Claim 7, wherein at least some of the triglyceride molecules are derived from an animal source selected from the group consisting of beef fat, port fat, poultry fat, and fish oil.

- 26. (Previously Presented) The palatability enhancer for an animal food of claim 7, wherein the donor is a sulfide salt, a sulfide liquor, elemental sulfur, a manufacturing byproduct that contains at least about 1% sulfur by weight, a nucleotide, urea, other molecules containing amine groups, a molecule that contains amide groups, a molecule that contain guanidine groups, a heterocyclic compound that can release and donate nitrogen atoms under cooking conditions, or a chemical manufacturing byproduct that contain at least about 5% nitrogen by weight.
- 27. (Previously Presented) The palatability enhancer for an animal food of claim 26, wherein the donor is a sulfide salt, a sulfide liquor, elemental sulfur, a nucleotide, urea, other molecules containing amine groups, a molecule that contains amide groups, a molecule that contain guanidine groups, or a heterocyclic compound that can release and donate nitrogen atoms under cooking conditions.
- 28. (Previously Presented) The palatability enhancer for an animal food of claim 26, wherein the donor is a nucleotide, urea, other molecules containing amine groups, a molecule that contains amide groups, a molecule that contain guanidine groups, or a heterocyclic compound that can release and donate nitrogen atoms under cooking conditions.
 - 29. (Cancelled)
- 30. (Currently Amended) The palatability enhancer for an animal food of claim 729, wherein cooking is performed for about 1 hour to about 6 hours.
 - 31. (Cancelled)
- 32. (Currently Amended) The palatability enhancer for an animal food of claim 734, wherein cooking at a temperature of about 110°C to about 200°C is performed for about 15 to about 60 minutes.

- 33. (Currently Amended) The palatability enhancer for an animal food of claim 78, wherein the second palatability enhancer ingredient is a digest of chicken livers with hydrolytic enzymes.
- 34. (New) The palatability enhancer for an animal food of claim 7, wherein the entire contents of the cooked product is used as an animal food flavorant.
- 35. (New) The animal food product of claim 10, wherein the entire contents of the cooked product is used as an animal food flavorant.